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- (56) Documents Cited

  GB 0659854 A GB 04

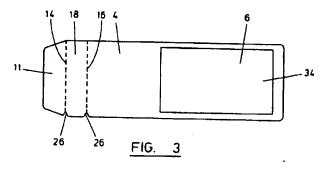
  US 4727667 A US 43

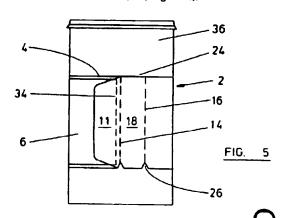
GB 0437397 A EP 0239273 A2 US 4324058 A US 4312523 A

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UK CL (Edition O ) B8F FBG
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ONLINE:WPI

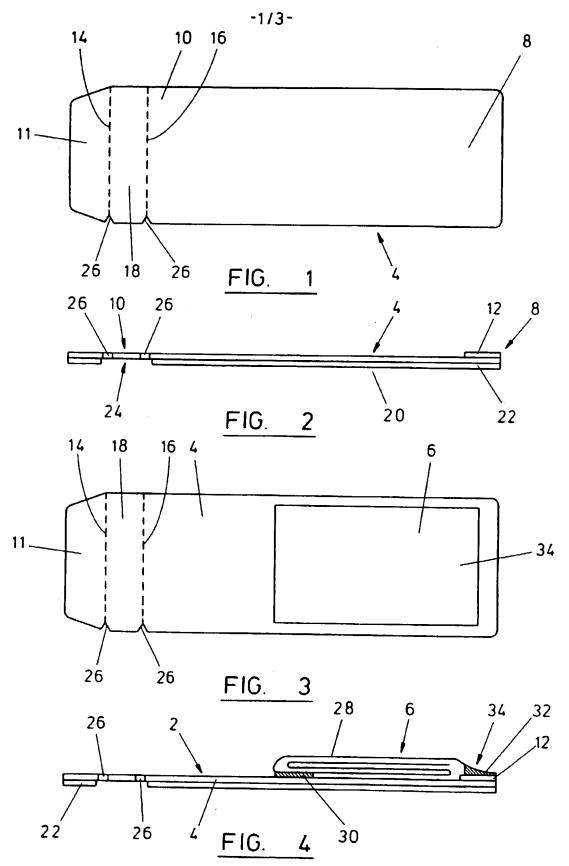
### (54) Label/leaflet assembly

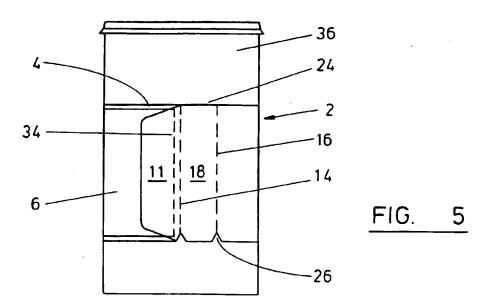
(57) An assembly 4 is adapted, in use, to wrap around a container 36 or cover such that one end 11 of the assembly cooperates with, and overlaps, at least part of its other end. This provides closure means for selectively controlling access to the overlapped portion which carries information, preferably in the form of a resealable leaflet or booklet 6. In order to gain access to the printed information, it is necessary to separate the two ends of the label by, for example, tearing along a row of perforations 14, 16, thereby permanently changing the structure of the label, and thus providing tamper evidence security. The leaflet 6 may comprise a sheet folded into overlapping panels which are held releasably closed by a resealable adhesive bond (12, 32, Figure 4).





At least one drawing originally filed was informal and the print reproduced here is taken from a later filed formal copy.





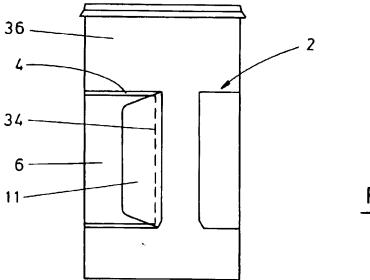
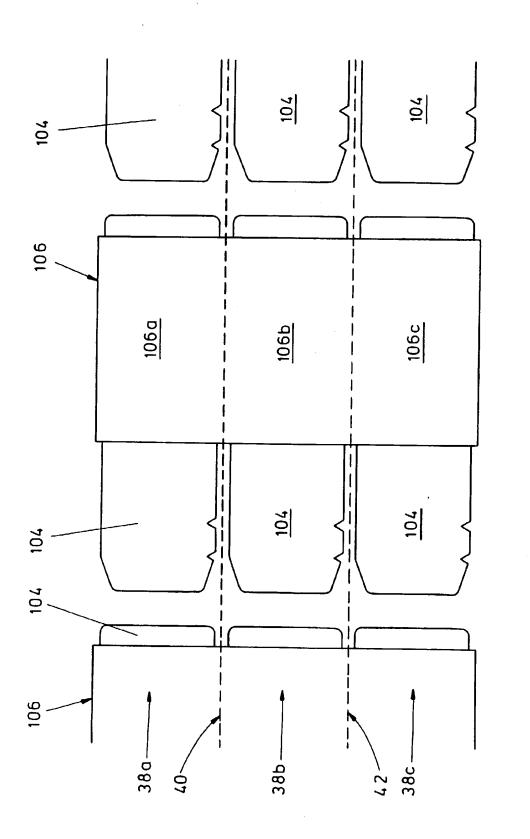


FIG. 6



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The present invention relates to leaflets, labels and the like, and more particularly, but not exclusively, the invention relates to leaflets intended to be adhesively secured to bottles, containers or the like.

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It is known to provide a label including a leaflet which is presented in a folded configuration, and which may be unfolded to reveal information printed on surfaces which were not previously visible. A resealable flap may be provided in order that the leaflet may be refolded and resealed.

One problem associated with labels of this kind, particularly when the leaflet is provided with numerous pages, is that the resealable bond is not sufficiently strong to hold the leaflet closed. It would therefore be desirable to provide a label of the aforementioned kind which does not suffer from such disadvantages.

It would also be desirable to provide a leaflet kind which additionally provides a tamper-proof facility such that access cannot be gained to the concealed information, without providing evidence thereof eg permanently changing some aspect of the leaflet's structure.

It is an object of the present invention to provide a leaflet or label assembly offering improvements in relation to one or more aspects of matters discussed herein; and/or to provide improvements generally.

Accordingly to the present invention there is provided a leaflet or label assembly comprising at least one portion carrying information, said leaflet assembly being capable of being configured, in use, so as to conceal said information, and further comprising closure means for selectively inhibiting or permitting access to the concealed information; characterised in that one part of the assembly, when wrapped around a container or

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cover, cooperates with another part thereof to form said closure means.

In another aspect of the invention there is provided a leaflet or label assembly adapted, in use, to wrap around a container or cover such that one end of the assembly cooperates with, and overlaps, at least part of its other end, thereby providing closure means for selectively controlling access to the overlapped portion.

In an embodiment, one end of the leaflet assembly cooperates with the other end by adhering thereto, and is provided with a release line to provide access to the overlapping portion. The release line may be formed by a tear-off portion by providing, for example, two rows of perforations, which separate the two ends of the label, thereby allowing access to the previously concealed portion of the assembly.

The label assembly may include a leaflet portion comprising a sheet foldable into two or more panels. One panel may form a cover sheet which extends beyond the area occupied by the remainder of the leaflet portion, and the cover sheet may be provided with the resealable adhesive on the inner face of its free end for securing the outer edge of the cover sheet to the surface of a backing portion, so as to allow the outer edge of the front panel to be selectively attached and reattached to provide repeated access to the interior to the leaflet portion. The folded leaflet portion may comprise a self-adhesive label, or it may be attached to one.

In this arrangement, when a leaflet assembly is secured around a container, one end of the assembly, forming the closure means, overlaps the resealable flap of the cover sheet, forming a secure permanent bond. In order to gain access to the information printed on the leaflet portion, it is necessary to separate the two ends

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of the label by, for example tearing along a row of perforations, thereby permanently changing the structure of the label. The separating of the two ends of the leaflet permanently changes the structure of the assembly, thus providing tamper evidence security.

A further aspect of the present invention there is provided a leaflet or label assembly comprising a resealable leaflet portion adapted, in use, to wrap around a container or cover, such that one end of the assembly co-operates with , and overlaps, at least part of its other end to reinforce or add to the adhesive effect in the region of the resealable adhesive.

It is envisaged that one end of the leaflet assembly may co-operate with the other end by adhering thereto, the first end being provided with either a peelable or a permanent adhesive.

Preferably a plurality of like self-adhesive leaflet assemblies are carried in succession on a length of release backing material, which can be wound on a reel. When labelling containers, the labels on the reel are removed from the backing material and the reel is unwound and these are then applied to containers using conventional labelling machinery.

An embodiment of the present invention will now be described, by way of example only, with reference to the following drawings in which :-

Fig 1 is a plan view of a carrier label forming part of a leaflet assembly in accordance with the present invention;

Fig 2 is a diagrammatic cross-sectional view of the carrier label of Fig 1;

Fig 3 is a plan view of the carrier label of Figs 1 and 2, with a leaflet portion affixed, forming a leaflet assembly;

Fig 4 is a diagrammatic cross-sectional view of the leaflet assembly of Fig 3;

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Fig 5 is a view of the leaflet assembly of Fig 4 attached to a container; and

Fig 6 is a view of the leaflet assembly of Fig 5, with a tamper proof strip removed, allowing access to the leaflet portion; and

Fig 7 is a diagrammic view of a series of leaflet assemblies according to a further embodiment of the invention.

As can be seen in Figs 1 to 4, a leaflet assembly 2 according to the present invention comprises a self-adhesive carrier label 4 forming a backing sheet for a leaflet portion 6.

The carrier label 4 is of generally rectangular configuration, having a first end 8 and a second end 10.

The first end 8 is provided with a layer of release coating 12 on the upper surface of the carrier label 4, and the second end 10 forms a flap 11 and is provided with two rows of perforations 14, 16 extending parallel to one another. The two rows of perforations 14, 16 define between them a strip 18.

The lower surface 20 of the carrier label 4 is provided with a layer of adhesive 22, which enables the carrier label 4 to be releasably adhered to a length of backing material (not shown) for storage purposes. In the region of the strip 18, the adhesive 22 is desensitized to form a non-adhesive section 24. Notches 26 are provided at one end of the perforations 14, 16 in the region of the desensitized section 24.

The leaflet portion 6 comprises a longitudinal strip divided into a series of panels by transverse fold lines and printed with information, with one panel forming a cover sheet 28, when the strip is folded in a concertina manner, as seen in Fig 4.

The leaflet portion 6 is adhered to the carrier label 4 by a line of permanent adhesive 30. The cover sheet 28 is releasably secured to the carrier label 4 by

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a line of adhesive 32 which is positioned to coincide with the release coating 12 thereby forming a resealable bond. The space on the carrier label 4, not occupied by the leaflet portion 6 can carry additional information, such as batch number, expiry date, product name etc.

In use, the leaflet assembly is applied to a container 36. The first end 8 of the carrier label 4 forms the leading edge, and is applied to the container 36 first. The length of the carrier label 4 is chosen such that the second end 10 of the carrier label 4 overlaps the first end 8 (as shown in Fig 5) and the flap 11 adheres to the cover sheet 28 of the leaflet portion 6, so that the first row of perforations 14 lie adjacent the leading edge 34 of the cover sheet 28 (shown in phantom in Figs 4, 5 and 6).

The flap 11 adheres to the leading edge 34 of the cover sheet 28 and forms a permanent bond.

In order to obtain access to the information contained in the leaflet portion 6, it is first necessary to remove the strip 18. This may be readily done because the adhesive in this area has been desensitized, to form the non-adhesive section 24. The two notches 26 provides a lead in to one end of the perforations 14, 16 to facilitate removal of the strip 18. The removal of the strip 18 separates the two ends of the carrier label 4 and thereby provides tamper evidence.

Once the strip 18 has been removed access can be gained to the leaflet portion by peeling back the cover sheet 28, thereby revealing the previously concealed surfaces of the sheet.

Because the flap 11 seals and/or inhibits access to the resealable cover sheet 28 with a re-inforced bond, a leaflet assembly according to the present invention has been found to be particularly advantageous when used in conjunction with containers or covers having a small diameter. With conventional resealable leaflet labels,

it has been found that leaflets having numerous pages can be somewhat bulky, and a peelable seal may not be sufficiently strong to maintain the sheet in its closed booklet form. In contrast, a leaflet assembly according to the present invention in which one end of the label overlaps and adheres permanently or peelably to the other end gives total security and product integrity.

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In the embodiments of Figs 1 to 6, the width of the leaflet portion 6 is less than the width of the carrier label 4. However, it is also envisaged that the width of the leaflet portion may be greater than its associated carrier label.

An illustration of the method of manufacture of such a leaflet assembly is shown in Fig 7. A number of like carrier labels 104 are arranged in rows 38a, 38b, 38c across a web of backing sheet, coated with a release material.

A composites leaflet portion 106 is applied to the carrier labels 104 across the rows 38a, 38b, 38c as seen in Fig 7.

The composite leaflet portion 106 is separated into individual leaflet portions 106a, 106b, 106c, which may or not be identical, by slitting or cutting between the rows 38a, 38b, 38c (shown as dotted lines 40, 42) using, for example rotary shear cut knives.

Label assemblies according to the present invention may be manufactured using the following method.

Referring first to Figs 1 to 6, a sheet is printed on one or both sides, trimmed to shape, and then folded to form leaflet portion 6. Folded leaflets portion 6 are loaded into a hopper feed unit.

The carrier labels 4 are formed from self-adhesive labels, which may be printed with additional information. A release coating 12 is applied to the top surface of the first end 8 of the carrier label 4, and a strip of adhesive on the underside is de-sensitised or "killed"

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forming region 24. The label 4 is then cut to shape, forming flap 11 and notches 26. Tear lines 14, 16 are formed by means of a perforator. Any waste material around the carrier label 4 is stripped and a web of carrier labels is wound onto a reel.

The web of carrier labels 4 is passed through adhesive applicator which provides each carrier label 4 with a line of permanent adhesive 30, and a further adhesive applicator applies a line of peelable adhesive 32. Each line of adhesive 30, 32 is applied at a predetermined location on the carrier label 4.

The web is then passed under the hopper feed unit and a folded leaflet portion 6 is applied in the desired registration onto the lines of adhesive, 30, 32. The leaflet portion 6 is secured to the carrier label 4 by passing the web through a securing press, and the web of completed label assemblies 2 is wound around a storage reel.

The labels may be applied to containers, or the like, using conventional labelling machinery.

#### CLAIMS

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- A leaflet or label assembly comprising at least one portion carrying information, said leaflet assembly being capable of being configured, in use, so as to conceal said information, and further comprising closure means for selectively inhibiting or permitting access to the concealed information; characterised in that one part of the assembly, when wrapped around a container or cover, cooperates with another part thereof to form said closure means.
- 2 A leaflet or label assembly adapted, in use, to wrap around a container or cover such that one end of the assembly cooperates with, and overlaps, at least part of its other end, thereby providing closure means for selectively controlling access to the overlapped portion.
- 3 An assembly according to claim 1 or claim 2 wherein one end of the leaflet assembly cooperates with the other end by adhering thereto, and is provided with a release line to provide access to the overlapping portion.
- An assembly according to claim 3 wherein the release line is formed by a tear-off portion by formed by providing at least one row of perforations.
  - 5 An assembly according to any one of the preceding claims further comprising a leaflet portion comprising a sheet foldable into two or more panels.
- 25 6 An assembly according to claim 5 wherein one of said panels forms a cover sheet which extends beyond the area occupied by the remainder of the leaflet portion.
  - 7 An assembly according to claim 6 wherein the cover sheet is provided with the resealable adhesive on the

inner face of its free end for securing the outer edge of the cover sheet to the surface of a backing portion.

An assembly according to any one of the preceding claims wherein the folded leaflet portion comprises a self-adhesive label, or is attached to one.

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- A leaflet or label assembly comprising a resealable leaflet portion adapted, in use, to wrap around a container or cover, such that one end of the assembly cooperates with, and overlaps, at least part of its other end to reinforce or add to the adhesive effect in the region of the resealable adhesive.
- 10 An assembly according to claim 9 wherein one end of the leaflet assembly co-operates with the other end by adhering thereto, the first end being provided with either a peelable or a permanent adhesive.
  - A plurality of like self-adhesive leaflet assemblies according to any one of the preceding claims carried in succession on a length of release backing material.
- 12 A leaflet or label assembly substantially as herein described with reference to the accompanying drawings.





Application No: Claims searched:

GB 9507199.9

1-12

Examiner: Date of search:

Stephen Smith 17 May 1996

Patents Act 1977 Search Report under Section 17

# Databases searched:

UK Patent Office collections, including GB, EP, WO & US patent specifications, in:

UK Cl (Ed.O): B8F (FBG)

Int Cl (Ed.6): G09F 3/02

Other: ONLINE:WPI

## Documents considered to be relevant:

| Category | Identity of document and relevant passage |   | Relevant<br>to claims |
|----------|---|---|-----------------------|
| x        | GB 659854                                 | (RIEBER) lines 54-71 of page 2                        | 1-6                   |
| х        | GB 437397                                 | (MILLER) line 77 of page 1 to line 36 of page 2       | 1-6                   |
| х        | EP 0239273 A2                             | (CETUS) line 55 of column 4 to line 38 of column 5    | 1-4, 9-11             |
| Х        | US 4727667                                | (INGLE) line 13 of column 3 to line 16 of column 4    | 1, 2, 9-11            |
| х        | US 4324058                                | (SHERWICK) line 48 of column 2 to line 17 of column 4 | 1, 2, 9-11            |
| х        | US 4312523                                | (HAINES) line 33 of column 2 to line 9 of column 3    | 1, 2                  |
|          |   |   |                       |

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